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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/768,962	01/30/2004	Vivek Nautiyal	02-IND-139	4549
23990	7590	09/12/2005	EXAMINER	
DOCKET CLERK P.O. DRAWER 800889 DALLAS, TX 75380			ZWEIZIG, JEFFERY SHAWN	
			ART UNIT	PAPER NUMBER
			2816	
DATE MAILED: 09/12/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/768,962

Applicant(s)

NAUTIYAL ET AL.

Examiner

Jeffrey S. Zweizig

Art Unit

2816

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 29 August 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4, 6-10 and 12-20 is/are rejected.
- 7) ☒ Claim(s) 5 and 11 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 30 January 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-4, 6-10 and 12-20 remain rejected under 35 U.S.C. 102(b) as being anticipated by Prater (USPN 5,574,633).

Figs. 2 and 3 disclose a plurality of signal lines 40/n12 wherein a plurality of circuits as shown in Fig. 3 correspond to each signal line n12 as shown in Fig. 2. For example, the source portion 40 corresponds to the load portion 312 of the signal line 40/312. Further disclosed is an intermediate floating virtual source/sink 36, a plurality of source portions 40, a plurality of load portions n12 and a charge redistribution circuit (n30, n14 & all of Fig. 3) as recited in claim 1. Component 48 generates the recited idle period.

Line 36 is seen as a charge storage element, a capacitor or a floating conductor as recited in claims 2, 4 and 6.

Fig. 3 is the transition detector including tri-state drives 56/58 and control switch 54/n30 as recited in claim 3. The first output connects to the A/B inputs of the tri-state drivers 56/58. The second output simultaneously enables the drivers at SEL and enables the switches at 54.

Claims 7-10 and 12 are anticipated for the reasons above.

The circuit performs the methods recited in claims 13-20. Furthermore, Fig. 3 shows an element 48 for delaying and an element 50 for XORing as recited in claim 17.

### ***Response to Amendments and Arguments***

3. In light of Applicants' amendments, the 112 rejections are withdrawn.

As explained in the revised art rejections above, Prater's element 40 is seen as the recited source portion of the signal line and element 312 is seen as the load portion of the signal line.

As pointed out in previous Office Actions, element 314 isolates the two portions by entering a high impedance state.

Applicants' comments regarding col. 6 lns. 44-46 are not understood. Element 40 is the source portion of the signal line because the data on source portion 40 is ultimately transferred to the load portion 312 of the signal line. Applicants should reread all of column 6.

### ***Conclusion***

4. Claims 5 and 11 are objected to as being dependent upon a rejected base claim, but may be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.


5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey S. Zweizig whose telephone number is (571)

Art Unit: 2816

272-1758. The examiner can normally be reached on Monday thru Wednesday 6:00 am to 6:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Timothy P. Callahan can be reached on (571) 272-1740. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Jeffrey S. Zweizig  
Primary Examiner  
Art Unit 2816

JZ